## REPORT

To the Committee on Internal Improvement, House of Delegates.

## GENTLEMEN:

In compliance with the request, contained in your communication of the 1st inst. that we should furnish to your Committee, such information as we might possess, in relation to a Rail Road from Baltimore to the City of Washington—we have given to the subject the consideration which its importance merits, and have now the honor to submit to you the following report, accompanied by a Map and Profile illustrative of the same.

The principles which should govern in the selection of a route for a Rail Road, so as to insure the accomplishment of those objects which should characterize a work, designed to afford the most speedy, certain and economical means of conveyance—have on former occasions been so fully explained, and are doubtless so well known to the Committee, that their recapitulation at this time would seem to be unnecessary.—It will suffice our present purpose to advert merely to the obvious advantages of adapting the plane of a Rail Road, to the state of the trade to be accommodated by it; or, in other words, to dispose it in such manner that there shall be the least power required for the transportation of the relative amounts to be conveyed upon it in each direction.—And if, as in the present case, the trade be expected to be equal in both directions, or nearly so-did the face of the country permit its construction, there could be no doubt of the decided superiority of a level noad. The object however, being celerity and safety of transportation, with economy-inasmuch as it seldom occurs that the most level is the most direct route, and frequently it happens that to pursue it advantageously expensive cuts and embankments become necessary to the graduation of the road bed—there are of course various considerations incident to a satisfactory solution of the problem involving the selection of the preferable route.

These, however, may be summarily stated to consist in the cost of construction compared with the relative effects of a given power on different planes of inclination; or, in other words, in the cost of construction compared with that of transportation.